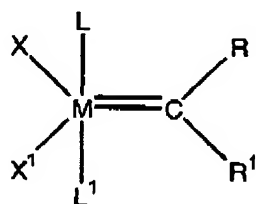


Amendment to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application:

1. (Currently Amended) A polymer composite consisting of at least one, optionally hydrogenated, nitrile rubber polymer having a Mooney viscosity (ML 1+4 @ 100°C) in the range of from 50-30 and a polydispersity index of less than 2.7, at least one filler and optionally at least one cross-linking agent,

wherein the optionally hydrogenated, nitrile rubber polymer is prepared by reacting a nitrile polymer in the presence of one or more compounds of the general formulas I, II, III or IV



Formula I

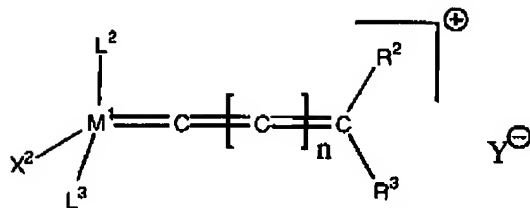
wherein:

M is Os or Ru,

R and R¹ are, independently, hydrogen or a hydrocarbon selected from the group consisting of C₂-C₂₀ alkenyl, C₂-C₂₀ alkynyl, C₁-C₂₀ alkyl, aryl, C₁-C₂₀ carboxylate, C₁-C₂₀ alkoxy, C₂-C₂₀ alkenyloxy, C₂-C₂₀ alkynyloxy, aryloxy, C₂-C₂₀ alkoxycarbonyl, C₁-C₂₀ alkylthio, C₁-C₂₀ alkylsulfonyl and C₁-C₂₀ alkylsulfinyl.

X and X¹ are independently any anionic ligand, and

L and L¹ are independently any neutral ligand, such as phosphines, amines, thioethers or imidazolidinylidene (which are especially preferred) or any neutral carbene, optionally, L and L¹ can be linked to one another to form a bidentate neutral ligand;



Formula II

wherein:

M¹ is Os or Ru;

R² and R³ are, independently, hydrogen or a hydrocarbon selected from the group consisting of C₂-C₂₀ alkenyl, C₂-C₂₀ alkynyl, C₁-C₂₀ alkyl, aryl, C₁-C₂₀ carboxylate, C₁-C₂₀ alkoxy, C₂-C₂₀ alkenyloxy, C₂-C₂₀ alkynyloxy, aryloxy, C₂-C₂₀ alkoxy carbonyl, C₁-C₂₀ alkylthio, C₁-C₂₀ alkylsulfonyl and C₁-C₂₀ alkylsulfinyl.

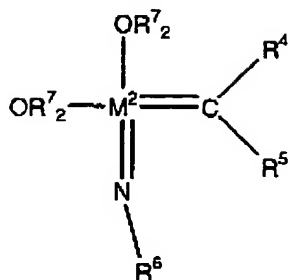
X² is an anionic ligand, and

L² is a neutral π -bonded ligand, independent of whether they are mono- or polycyclic.

L³ is a ligand selected from the group consisting of phosphines, sulfonated phosphines, fluorinated phosphines, functionalized phosphines bearing up to three aminoalkyl-, ammoniumalkyl-, alkoxyalkyl-, alkoxy carbonylalkyl-, hydroxycarbonylalkyl-, hydroxyalkyl- or ketoalkyl- groups, phosphites, phosphinites, phosphonites, phosphinamines, arsines, stibenes, ethers, amines, amides, imines, sulfoxides, thioethers and pyridines.

Y⁻ is a non-coordinating anion,

n is an integer in the range of from 0 to 5;

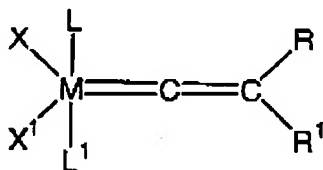


Formula III

wherein

M² is Mo or W.

R⁴ and R⁵ are, independently, hydrogen or a hydrocarbon selected from the group consisting of C₂-C₂₀ alkenyl, C₂-C₂₀ alkynyl, C₁-C₂₀ alkyl.



Formula IV

aryl, C₁-C₂₀ carboxylate, C₁-C₂₀ alkoxy, C₂-C₂₀ alkenyloxy, C₂-C₂₀ alkynyloxy, aryloxy, C₂-C₂₀ alkoxycarbonyl, C₁-C₂₀ alkylthio, C₁-C₂₀ alkylsulfonyl and C₁-C₂₀ alkylsulfinyl.

R⁶ and R⁷ are independently selected from any unsubstituted or halo-substituted alkyl, aryl, aralkyl groups or silicon-containing analogs thereof, wherein:

M is Os or Ru.

R and R¹ are independently selected from the group consisting of hydrogen, substituted or unsubstituted alkyl, and substituted or unsubstituted alkyl.

X and X¹ are independently any anionic ligand, and L and L¹ are independently any neutral ligand, such as phosphines, amines, thioethers or imidazolidinylidene (which are especially preferred) or any neutral carbene, optionally, L and L¹ can be linked to one another to form a bidentate neutral ligand.

2. (Previously Presented) The polymer composite according to Claim 1 wherein the Mooney viscosity (ML 1+4 @ 100°C) is in the range of from 45-30.
3. (Previously Presented) The polymer composite according to Claim 1 wherein the Mooney viscosity (ML 1+4 @ 100°C) is in the range of from 40-30.
4. (Previously Presented) The polymer composite according to Claim 1, wherein the polymer composite comprises a peroxide or sulfur curing system.
5. (Previously Presented) A process for preparing the polymer composite according Claim 1 comprising mixing at least one, optionally hydrogenated, nitrile rubber polymer having a Mooney viscosity (ML 1+4 @ 100°C) in the range of from 50-30 and a polydispersity index of less than 2.7, at least one filler and optionally at least one cross-linking agent.
6. (Previously Presented) A process for the manufacture of a shaped article comprising the step of injection molding a polymer composite comprising at least one, optionally hydrogenated, nitrile rubber polymer having a Mooney viscosity (ML 1+4 @ 100°C) in the range of from 50-30 and a polydispersity index of less than 2.7, at least one filler and at least one cross-linking agent.
7. (Previously Presented) The process according to Claim 6, wherein the shaped article is a seal, a hose, a bearing pad, a stator, a well head seal, a valve plate, a cable sheathing, a wheel roller, a belt, in place gaskets or a pipe seal.

PO-7959

- 5 -